Thermo
SCIENTIFIC

Type 12200
Blood Bank Dri-Bath

Operation Manual
and Parts List

Model #	Voltage
DB12215E	120
DB12215E-60	120

LT656X1 • 2/26/07

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IMPORTANT INFORMATION

This manual contains important operating and safety information. You must carefully read and understand the contents of this manual prior to the use of this equipment.

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Safety Information

Alert Signals

Warning
Warnings alert you to a possibility of personal injury.

Caution
Cautions alert you to a possibility of damage to the equipment.

Note
Notes alert you to pertinent facts and conditions.

Your Thermo Scientific Type 12200 Blood Bank Dri-Bath has been designed with function, reliability, and safety in mind. It is the user's responsibility to install it in conformance with local electrical codes. For safe operation, please pay attention to the alert signals throughout the manual.

Warnings

To avoid electrical shock, always:

1. Use a properly grounded electrical outlet of correct voltage and current handling capacity.

2. Disconnect from the power supply prior to maintenance and servicing.

To avoid personal injury:

1. Do not use in the presence of flammable or combustible materials. Fire or explosion may result. This device contains components which may ignite such materials.

2. Caution: Hot Surface - Avoid Contact. The block becomes hot while the unit is operating and will remain hot for some time after the unit is turned off.

3. Refer servicing to qualified personnel.

Warning
Refer servicing to qualified personnel.

Please note the following WARNINGS:

This warning is presented for compliance with California Proposition 65 and other regulatory agencies and only applies to the insulation in this product. This product contains refractory ceramic, refractory ceramic fiber or fiberglass insulation, which can produce respirable dust or fibers during disassembly. Dust or fibers can cause irritation and can aggravate preexisting respiratory diseases. Refractory ceramic and refractory ceramic fibers (after reaching 1000°C) contain crystalline silica, which can cause lung damage (silicosis). The International Agency for Research on Cancer (IARC) has classified refractory ceramic fiber and fiberglass as possibly carcinogenic (Group 2B), and crystalline silica as carcinogenic to humans (Group 1).

The insulating materials can be located in the door, the hearth collar, in the chamber of the product or under the hot plate top. Tests performed by the manufacturer indicate that there is no risk of exposure to dust or respirable fibers resulting from operation of this product under normal conditions. However, there may be a risk of exposure to respirable dust or fibers when repairing or maintaining the insulating materials, or when otherwise disturbing them in a manner which causes release of dust or fibers. By using proper handling procedures and protective equipment you can work safely with these insulating materials and minimize any exposure. Refer to the appropriate Material Safety Data Sheets (MSDS) for information regarding proper handling and recommended protective equipment. For additional MSDS copies, or additional information concerning the handling of refractory ceramic products, please contact the Customer Service Department at 1-800-553-0039.

Introduction

Performance Characteristics & Specifications

Model	Volts	Amps	Watts	Hz	Wells
DB12215E, DB12215E-60	120	.4	47	50/60	40

Operating Range:	Ambient Plus 5°C to 60°C
Temperature Uniformity:	+ 0.5°C
Temperature Stability:	+ 0.5°C
Ambient Operating Range:	68-74°F (20-23°C)
Repeatability:	+ 0.5°C

Factory Calibrated to 37°C.

Heat-up time of unloaded dri-bath from a cold start to 37°C — 20 minutes.

Heat-up time for 40 each 10mm x 75mm or 12mm x 75mm tubes filled to heating block level with water placed in a preheated block at 37°C — 10 minutes.

Designed for continuous service.

Intended Use

The Type 12200 Blood Bank Dri-Bath provides a controlled dry heat environment for 10mm or 12mm test tubes containing in vitro diagnostic specimens or samples for qualitative or quantitative test procedures. Please refer to the clinical laboratory method specified by the reagent manufacturer or established by medical technology for product application.

Function

The Blood Bank Dri-Bath provides incubating temperatures in the range of Ambient Plus 5°C-60°C for 10mm or 12mm test tubes. The -60 units contain wells for 10mm tubes.

Installation

Remove the incubator from the carton. Check the voltage specifications and plug into the properly grounded receptacle.

Operation

Note
Do not place dri-bath in a draft, sunlight or near equipment which emits heat or cold as this may result in fluctuating temperatures.

Test tube liquid levels should not exceed the level of the well depth. (25mm).

Placing a full load of cold tubes in the dri-bath will extend recovery time.Only 10mm test tubes should be used in the (-60) dri-bath to obtain optimum results.

Warning
Do not use in the presence of flammable or combustible chemicals. Fire or explosion may result; this device contains components which may ignite such materials. Caution: Hot Surface - Avoid Contact. The block becomes hot while the unit is operating and will remain hot for some time after the unit is turned off.

Note
Unplug unit when making calibrating adjustments.

10mm (-60) Block Models

Plug the dri-bath into the properly grounded receptacle. Insert a calibrated laboratory thermometer* into a 10 x 75mm test tube containing 1.10 mls. of solution. Place the test tube in a well. Wait the specified time until the thermometer indicates 37°C. You are ready to incubate your tubes when the thermometer temperature has stabilized within + 0.5°C.

Calibration

Equipment required:

- Regular tip (slot type).080” screwdriver.
- Test tube — 10 x 75mm.
- Calibrated laboratory thermometer*

**Calibrated for 25mm immersion depth.*

Pour 1.10 mls. of solution into the 10 x 75mm test tube. Insert the thermometer into the tube and place tube in any dri-bath well. Wait until the dri-bath has come to temperature and stabilized. Insert the screwdriver into the 5/16” calibration port located in the rear of the unit. Turn the adjusting screw clockwise to increase temperature and counterclockwise to decrease temperature. One complete turn will change the temperature approximately 10°C. Allow 10 minutes stabilization time between fine adjustments.

Note
Do not place dri-bath in a draft, sunlight or near equipment which emits heat or cold as this may result in fluctuating temperatures.

Test tube liquid levels should not exceed the level of the well depth. (25mm).

Placing a full load of cold tubes in the dri-bath will extend recovery time.Only 12mm test tubes should be used in the dri-bath to obtain optimum results.

Warning
Plug the dri-bath into the properly grounded receptacle. Insert a calibrated laboratory thermometer* into a 12 x 75mm test tube containing 1.25 mls. of solution. Place the test tube in a well. Wait the specified time until the thermometer indicates 37°C. You are ready to incubate your tubes when the thermometer temperature has stabilized within + 0.5°C.

Note
Unplug unit when making calibrating adjustments.

12mm Block Model

Plug the dri-bath into the properly grounded receptacle. Insert a calibrated laboratory thermometer* into a 12 x 75mm test tube containing 1.25 mls. of solution. Place the test tube in a well. Wait the specified time until the thermometer indicates 37°C. You are ready to incubate your tubes when the thermometer temperature has stabilized within + 0.5°C.

Calibration

Equipment required:

- Regular tip (slot type) .080” screwdriver
- Test tube 12 x 75mm
- Calibrated laboratory thermometer*

**Calibrated for 25mm immersion depth.*

Pour 1.25 mls. of solution into the 12 x 75mm test tube. Insert the thermometer into the tube and place tube in any dri-bath well. Wait until the dri-bath has come to temperature and stabilized. Insert the screwdriver into the 1/4” calibration port located in the rear of the unit. Turn the adjusting screw clockwise to increase temperature and counterclockwise to decrease temperature. One complete turn will change the temperature approximately 10°C. Allow 10 minutes stabilization time between fine adjustments.

Maintenance

Cleaning

Unplug incubator. Use a moist cleaning cloth to clean the painted case and wells. Dry thoroughly.

Parts List

Part No.	Description	No. Req.
120 Volt Models		
PC656X1A	Control	1
EL656X1A	Element	1
BK250X1A	Block, Heating 12MM	1
BK250X2A	Block, Heating 10 MM (-60 Models)	1
CR598X1	Cord Set	1
PLX97	Light, Pilot	1

Ordering Procedures

Please refer to the Specification Plate for the complete model number, serial number, and series number when requesting service, replacement parts or in any correspondence concerning this unit.

All parts listed herein may be ordered from the **Thermo Scientific** dealer from whom you purchased this unit or can be obtained promptly from the factory. When service or replacement parts are needed we ask that you check first with your dealer. If the dealer cannot handle your request, then contact our Customer Service Department at 563-556-2241 or 800-553-0039.

Prior to returning any materials, please contact our Customer Service Department for a “Return Materials Authorization” number (RMA). Material returned without an RMA number will be refused.

One Year Limited Warranty

This Thermo Scientific product is warranted to be free of defects in materials and workmanship for one (1) year from the first to occur of (i) the date the product is sold by the manufacturer or (ii) the date the product is purchased by the original retail customer (the “Commencement Date”). Except as expressly stated above, the MANUFACTURER MAKES NO OTHER WARRANTY, EXPRESSED OR IMPLIED, WITH RESPECT TO THE PRODUCTS AND EXPRESSLY DISCLAIMS ANY AND ALL WARRANTIES, INCLUDING BUT NOT LIMITED TO, WARRANTIES OF DESIGN, MERCHANT ABILITY AND FITNESS FOR A PARTICULAR PURPOSE.

An authorized representative of the manufacturer must perform all warranty inspections. In the event of a defect covered by the warranty, we shall, as our sole obligation and exclusive remedy, provide free replacement parts to remedy the defective product. In addition, for products sold within the continental United States or Canada, the manufacturer shall provide free labor to repair the products with the replacement parts, but only for a period of ninety (90) days from the Commencement Date.

The warranty provided hereunder shall be null and void and without further force or effect if there is any (i) repair made to the product by a party other than the manufacturer or its duly authorized service representative, (ii) misuse (including use inconsistent with written operating instructions for the product), mishandling, contamination, overheating, modification or alteration of the product by any customer or third party or (iii) use of replacement parts that are obtained from a party who is not an authorized dealer of Thermo Scientific products.

Heating elements, because of their susceptibility to overheating and contamination, must be returned to the factory and if, upon inspection, it is concluded that failure is due to factors other than excessive high temperature or contamination, the manufacturer will provide warranty replacement. As a condition to the return of any product, or any constituent part thereof, to the factory, it shall be sent prepaid and a prior written authorization from the manufacturer assigning a Return Materials Number to the product or part shall be obtained.

IN NO EVENT SHALL THE MANUFACTURER BE LIABLE TO ANY PARTY FOR ANY DIRECT, INDIRECT, SPECIAL, INCIDENTAL, OR CONSEQUENTIAL DAMAGES, OR FOR ANY DAMAGES RESULTING FROM LOSS OF USE OR PROFITS, ANTICIPATED OR OTHERWISE, ARISING OUT OF OR IN CONNECTION WITH THE SALE, USE OR PERFORMANCE OF ANY PRODUCTS, WHETHER SUCH CLAIM IS BASED ON CONTRACT, TORT (INCLUDING NEGLIGENCE), ANY THEORY OF STRICT LIABILITY OR REGULATORY ACTION.

For the name of the authorized Thermo Scientific product dealer nearest you or any additional information, contact us:

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